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IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re: Application of HATCHER, et al.

Application No.:

10/616,884

Examiner:

Date Filed:

July 10, 2003

Group:

1615

For:

SOL-GEL DERIVED BIOACTIVE GLASS POLYMER COMPOSITE

CERTIFICATE UNDER 37 CFR 1.8(a)

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Neil R. Jetter

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Date: July 14, 2004

INFORMATION DISCLOSURE STATEMENT

Sir:

Pursuant to the Duty to Disclose under 37 C.F.R. §1.56, Applicants hereby disclose information that may be relevant to the Examiner's consideration of the above-identified application and the patentability of its claims.

In accordance with Rules 56, 97, and 98 of the Rules of Practice in Patent Cases (37 C.F.R. §§ 1.56, 1.97, and 1.98), Form PTO/SB/08B and copies of references cited therein are submitted for consideration by the Examiner. While the references provided in this Information Disclosure Statement may be material to patentability pursuant to 37 C.F.R. § 1.56, it is not intended to constitute an admission that any reference referred to herein is prior art for this invention unless specially designated as such. Also, in accordance with 37 C.F.R. § 1.97(g), the

In re Application of: HATCHER et al. Application No.:

10/616,884

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This Information Disclosure Statement is being filed before the issuance of a first office action on the merits of the application (37 C.F.R. 1.97(b)(3)); therefore, no fee is believed to be due. However, if any fee is due, the Commissioner is authorized to charge any such fee and any additional fees due or credit any overpayment to Deposit Account No. 50-0951.

Respectfully submitted

Neil R. Jetter, Reg. No. 46,803 AKERMAN SENTERFITT

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Docket No. 5853-428

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Sheet	1	of	1	Attorney Docket Number	5853-428		

		NON PATENT LITERATURE DOCUMENTS	
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=		ORÉFICE, et al., "Novel sol-gel bioactive fibers," Journal of Biomedical Materials Research, 55(4):460-467, 2001.	
		DOMINGUES et al., "A sol-gel derived bioactive fibrous mesh," Journal of Biomedical Materials Research, 55(4):468-474, 2001.	
		BRINKER et al., "SOL-GEL SCIENCE: The Physics and Chemistry of Sol-Gel Processing," San Diego: Academic Press, 1990.	
		OTSUBO, Y., "Rheology of colloidal suspensions flocculated by reversible bridging," Chemical Engineering Science, 56:2939-2946, 2001.	
		AGREN et al., "Phase Behavior and Structural Changes in Tetraethylorthosilicate-Derived Gels in the Presence of Polyethylene Glycol, Studied by Rheological Techniques and Visual Observations," Journal of Colloid and Interface Science, 204:45-52, 1998.	
		BIGGS et al., "Aggregate structures formed via a bridging flocculation mechanism," Chemical Engineering Journal, 80:13-22, 2000.	
,		KOKUBO et al., "Solutions able to reproduce in vivo surface-structure changes in bioactive glass-ceramic A-W3," Journal of Biomedical Materials Research, 24:721-734, 1990.	
		YUAN et al., "Bone Induction by Porous Glass Ceramic Made from Bioglass (45S5)," Journal of Biomedical Materials Research, 58:270-276, 2001.	
		SMITH et al., "Calcium Phosphate Hydroxide," JCPDS International Center for Diffraction Data, CAS#1306-06-5-1996.	
		SIRCARL, A., "An introduction to glass and glass fiber manufacturing technology with application to nonwoven process," Tappi Journal 76:167-175, 1993.	

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